

Resilient Seated bi-directional Butterfly Valves, sizes 50 - 300 mm to 1200 kPa.

Features

- Triple function resilient seat provides drop-tight shutoff and totally isolates the valve body and stem from the line media. The molded-in, O-ring seat design serves as flange seals, totally eliminating the need for gaskets.
- Upper and lower inboard shaft bearings prevent shaft deflection and provide optimum guidance to prolong valve life.
- Unique dove tail seat retention design allows convenient and economical field replacement.
- Superior, one-piece thru-shaft design provides high-strength and positive disc control.
- Internal shaft seal prevents external media from entering valve and also adjusts for pressure and shaft rotation.
- Heavy-duty, corrosion-resistant top bushing absorbs actuator side thrust.
- Polished disc edge ensures optimum performance and maximum seat life.
- Stainless steel torque plug provide positive leak proof connections while allowing for quick and easy disassembly.
- One-piece body with extended neck allows clearance for flanges and insulation.
- Every valve is factory-tested to 110 percent of their pressure rating.



General Applications

Figures AR1 and AR2 are heavy duty, resilient seated butterfly valves that are ideally suited for many high performance applications, such as, water treatment, cooling systems, food and beverage and bulk product handling.



Technical Data

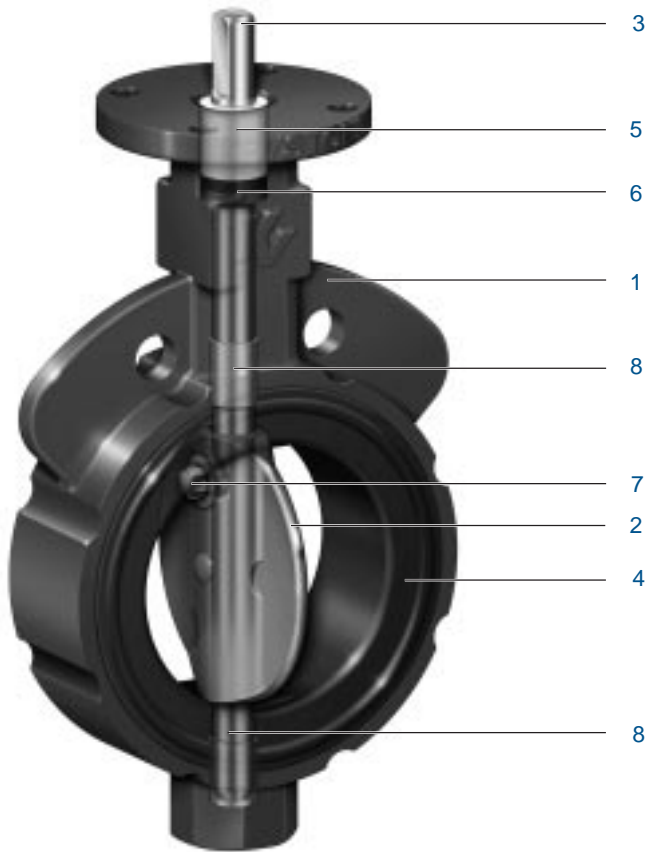
Size Range:
 Figure AR1 (wafer style) 50-300 mm
 Figure AR2 (lugged style) 50-300 mm

Pressure:
 Vacuum to 1200 kPa

Temperature:
 Minus 40°C to 120°C (EPDM seat)
 Minus 18°C to 100°C (Buna-N)

End Connections:
 AS 2129 E & ANSI 150 as standard
 (Consult Factory for other drillings)

Butterfly Valves – Figure AR1/AR2



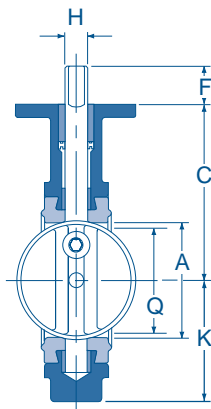
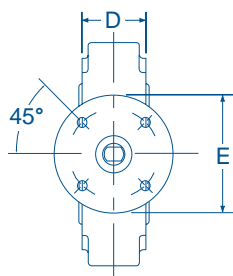
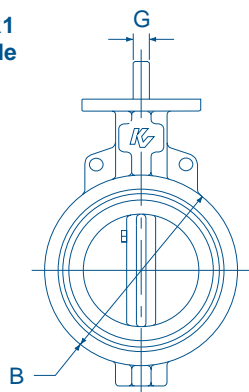
Parts Lists

No.	Description	Standard Material	Material Specification
1	Body	Cast Iron	ASTM A-126, Class B
2	Disc	Aluminium bronze S.G. Iron ENP 316 Stainless steel	ASTM B-148, UNS C95200 Grade A ASTM A-536 GR 65/45/12 ASTM A-743, CF8M
3	Shaft	316 Stainless steel	ASTM A-276 UNS S31600
4	Seats	EPDM Buna-N	Food Grade Food Grade
5	Shaft bushing	Polyester	–
6	Shaft packing	Buna-N	–
7	Torque plug	316 Stainless steel	ASTM A-276 UNS S31600
8	Upper & lower Bearing	Sintered Metal	–

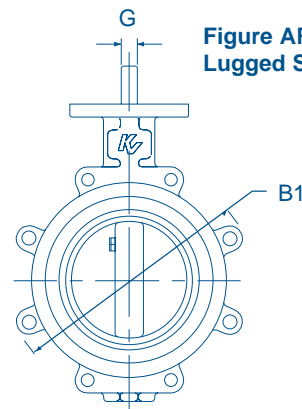
Note:

ENP = Electroless Nickel Plated (for corrosion resistance)

**Figure AR1
Wafer Style**



**Figure AR2
Lugged Style**



Dimensions (mm)

Valve Size mm	Stem Conn. Code	A	B	B1	C	D	E	F	K	Q	Stem Conn. H x G inches	Keyway inches	Top Plate Data			Mass kg	
													PCD	N° Holes	Dia	AR1	AR2
50	BAB	51	105	150	140	41	102	32	70	35	9/16 x 3/8	N/A	83	4	11	2.9	3.2
65	BAB	64	117	175	152	44	102	32	76	52	9/16 x 3/8	N/A	83	4	11	3.9	4.5
80	BAB	76	130	187	159	44	102	32	88	65	9/16 x 3/8	N/A	83	4	11	4.5	5.2
100	BAC	102	162	222	178	51	102	32	102	92	5/8 x 7/16	N/A	83	4	11	6.4	8.2
125	BAD	127	187	254	191	54	102	32	119	121	3/4 x 1/2	N/A	83	4	11	8.2	10.2
150	BAD	146	216	279	203	54	102	32	133	140	3/4 x 1/2	N/A	83	4	11	10.0	12.9
200	CAE	197	271	337	241	64	152	32	170	191	7/8 x 5/8	N/A	127	4	14	17.2	22.2
250	CAF	248	330	403	273	64	152	51	210	244	1 1/8	1/4 x 1/4	127	4	14	23.1	31.3
300	CAF	298	376	473	311	76	152	51	238	294	1 1/8	1/4 x 1/4	127	4	14	32.2	48.5

Notes:

"Q" dimension is the allowable pipe or flange inside diameter at the centered body face to protect the disc sealing edge against damage when opening the valve.

Dimensions are nominal ± 1mm.

Butterfly Valves – Figure AR1/AR2

Typical Specifying Sequence

Example:	100	AR1	061	AE
	Valve Size	Figure No.	Trim Code	End Connections

Size Range: 50 - 300mm

Figure No. AR1 - Wafer style resilient seated bi-directional Butterfly valve.
AR2 - Lugged style resilient seated bi-directional Butterfly valve.

Figure No.	Trim Code		Body	Disc	Shaft	Seat	Bearing	Packing	Torque Plug
	Numeric	Alpha							
AR1/AR2	061	CLE2	Cast Iron	Al Bronze	316 S/S	EPDM	Sintered	Buna-N	316 S/S
AR1/AR2	064	CLE3	Cast Iron	Al Bronze	316 S/S	Buna-N	Sintered	Buna-N	316 S/S
AR1/AR2	285	CYE3	Cast Iron	S.G. Iron ENP*	316 S/S	Buna-N	Sintered	Buna-N	316 S/S
AR1/AR2	323	CYE2	Cast Iron	S.G. Iron ENP*	316 S/S	EPDM	Sintered	Buna-N	316 S/S
AR1/AR2	723	CEE3	Cast Iron	316 S/S	316 S/S	Buna-N	Sintered	Buna-N	316 S/S
AR1/AR2	805	CEE2	Cast Iron	316 S/S	316 S/S	EPDM	Sintered	Buna-N	316 S/S

Notes:

*ENP = Electroless Nickel Plated (for corrosion resistance)

End Connections

- AE = AS 2129 table E
- AN = ANSI 150 B16-1 150
- Other flange drillings available on request.

Available Actuators & Accessories

Figure No.	Description
F790	Aluminium Pneumatic actuators, double acting or spring return.
F79R	Ductile Iron Pneumatic actuators, double acting or spring return.
F79S	Stainless steel Pneumatic actuators, double acting or spring return.
F777	Electric actuators.
F77Q	Heavy duty Electric actuators.
F791	Solenoid valves.
F792	Limit switches.
F793	Positioners.
F427	Gear operations.

